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Attorney Docket No. 9407-21

PATENT

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re: Robert Janssen et al.

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Serial No.: 09/942,135

Group Art Unit: 2127

Filed: August 29, 2001

Examiner: Kenneth Tang

For: SYSTEM AND METHOD FOR MONITORING SOFTWARE QUEUING
APPLICATIONS

Date: November 30, 2005

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Commissioner for Patents

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APPELLANTS' AMENDED BRIEF ON APPEAL UNDER 37 C.F.R. § 41.37

Sir:

This Amended Appeal Brief is filed pursuant to the *Notice of Appeal to the Board of Patent Appeals and Interferences* filed July 19, 2005 and pursuant to the *Notification of Non-Compliant Appeal Brief* mailed November 25, 2005.

It is not believed that an extension of time and/or additional fee(s) are required, beyond those that may otherwise be provided for in documents accompanying this paper. In the event, however, that an extension of time is necessary to allow consideration of this paper, such an extension is hereby petitioned under 37 C.F.R. § 1.136(a). Any additional fees believed to be due may be charged to Deposit Account No. 09-0457.

Real Party In Interest

The real party in interest is assignee International Business Machines Corporation of Armonk, New York.

Related Appeals and Interferences

Appellants are aware of no appeals or interferences that would be affected by the present appeal.

Status of Claims

Claims 1-18 remain pending, each of which is finally rejected. Appellants appeal the final rejection of Claims 1-18. The attached Appendix A presents the pending claims as finally rejected in the Office Action of April 21, 2005.

Status of Amendments

The attached Appendix A presents the claims as they currently stand. A *Response* was filed in this case on January 4, 2005 in which Claim 1 was amended and new Claims 13-18 were added. This January 4, 2005 *Response* was entered. A *Response After Final* was filed on June 21, 2005, which amended Claim 13. The June 21, 2005 *Response After Final* was entered in the Advisory Action dated July 12, 2005, but was deemed insufficient to place the case in condition for allowance. Thus, each of the two amendments in this case have been entered.

Summary of Claimed Subject Matter

A. Claim 1

Independent Claim 1 is directed to a computer implemented method for gathering status information in a message queuing transmission system. Fig. 1 shows an embodiment of such a system 100 in which the method of Claim 1 may be carried out. In the methods according to Claim 1, a first queue group such as the group of "input queues" shown in Fig. 1 may be formed by assigning an input queue group identifier (e.g., identifier "G1") to a first input queue and to a second input queue (three input queues are depicted in Fig. 1) within the message queuing transmission system 100. Likewise, a second queue group such as the group of "output queues" shown in Fig. 1 may be formed by assigning an output queue group identifier (e.g., identifier "G3") to a first output queue and to a second output queue (four output queues are depicted in Fig. 1) within the system 100. A first queue identifier (e.g., G1_1) is assigned to the first input queue, a second queue identifier (e.g., G1_2) is assigned to the second input queue, a third queue identifier (e.g., G3_1) is assigned to the first output queue, and a fourth queue identifier (e.g., G3_2) is assigned to the second output queue. A task identifier (e.g., TSK1) is assigned to a processing task within the system 100. A first number of messages stored in the first input queue, a second number of messages stored in the second input queue, a third number of messages stored in the first output queue, and a fourth number of messages stored in the second output queue are each determined, as is an activation status of the processing task (e.g., TSK1). Finally, the first number of messages stored in the first input queue, the second number of messages stored in the second input queue, the third number of messages stored in the first output queue, the fourth number of

messages stored in the second output queue, and the activation status of the processing task are gathered in a task monitor storage area 113.

To further explain the subject matter of Claim 1, Appellants have repeated Claim 1 below and, in bold, bracketed text, identified the reference numeral or other identifier that comprises an example of the claimed subject matter according to certain embodiments of the present invention, followed by page and line number references to exemplary locations in the specification where the reference numeral/identifier is discussed:

1. A computer implemented method for gathering status information in a message queuing transmission system [100; p. 6, line 18 through p. 8, line 13 and Fig. 1], the method comprising:

forming a first queue group [**Input Queues Group**; p. 4, lines 21-24, p. 7, lines 5-12 and Fig. 1] by assigning an input queue group identifier [G1; p. 4, lines 21-24, p. 7, lines 5-12 and Fig. 1] to a first input queue [**First input queue**; depicted in Fig. 1, *see also* p. 4] and to a second input queue [**Second input queue**; depicted in Fig. 1, *see also* p. 4] within a message queuing transmission system [100; p. 6, line 18 through p. 8, line 13 and Fig. 1];

forming a second queue group [**Output Queues Group**; p. 4, lines 21-24, p. 7, lines 5-12 and Fig. 1] by assigning an output queue group identifier [G3; p. 4, lines 21-24, p. 7, lines 5-12 and Fig. 1] to a first output queue [**First output queue**; depicted in Fig. 1, *see also* p. 4] and to a second output queue [**Second output queue**; depicted in Fig. 1, *see also* p. 4] within the message queuing transmission system [100; pp. 6, line 18 through p. 8, line 13 and Fig. 1];

assigning a first queue identifier [G1_1; Depicted in Fig. 1, exemplary naming convention for individual queues shown in Fig. 3, *see also* p. 4] to the first input queue [**First input queue**; depicted in Fig. 1, *see also* p. 4], a second queue identifier [G1_2; Depicted in Fig. 1, exemplary naming convention for individual queues shown in Fig. 3, *see also* p. 4] to the second input queue [**Second input queue**; depicted in Fig. 1, *see also* p. 4], a third queue identifier [G3_1; Depicted in Fig. 1, exemplary naming convention for individual queues shown in Fig. 3, *see also* p. 4] to the first output queue [**First output queue**; depicted in Fig. 1, *see also* p. 4], and a fourth queue identifier [G3_2; Depicted in Fig. 1, exemplary naming convention for individual queues shown in Fig. 3, *see also* p. 4] to the second output queue [**Second output queue**; depicted in Fig. 1, *see also* p. 4];

assigning a task identifier [TSK1; p. 5, line 1 and Fig. 2] to a processing task [Input Task 104; p. 4, lines 16-19, p. 5, line 1, p. 7, lines 5-12 and 19-28 and Fig. 1] within the message queuing transmission system [100; p. 6, line 18 through p. 8, line 13 and Fig. 1] that is able to read a plurality of messages [Messages depicted in input queues; Fig. 1, *see also* p. 4] from one of the queues [First input queue; depicted in Fig. 1, *see also* p. 4] in the first queue group [Input Queues Group; p. 4, lines 21-24, p. 7, lines 5-12 and Fig. 1] and to write a plurality of messages [Messages depicted in output queues; Fig. 1, *see also* p. 4] to at least one of the queues [First output queue; depicted in Fig. 1, *see also* p. 4] in the second queue group [Output Queues Group; p. 4, lines 21-24, p. 7, lines 5-12 and Fig. 1];

determining a first number of messages [512; p. 15, lines 22-26 and Fig. 5, *see also* p. 5, lines 4-6] stored in the first input queue [First input queue; depicted in Fig. 1, *see also* p. 4], a second number of messages [512; p. 15, lines 22-26 and Fig. 5, *see also* p. 5, lines 4-6] stored in the second input queue [Second input queue; depicted in Fig. 1, *see also* p. 4], a third number of messages [512; p. 15, lines 22-26 and Fig. 5, *see also* p. 5, lines 4-6] stored in the first output queue [First output queue; depicted in Fig. 1, *see also* p. 4], and a fourth number of messages [512; p. 15, lines 22-26 and Fig. 5, *see also* p. 5, lines 4-6] stored in the second output queue [Second output queue; depicted in Fig. 1, *see also* p. 4];

determining an activation status [510; pp. 5, lines 7-8, p. 7, line 26 through p. 8, line 2, p. 15, lines 15-21 and Fig. 5] of the processing task [Input Task 104; p. 4, lines 16-19, p. 5, line 1, p. 7, lines 5-12 and 19-28 and Fig. 1]; and

gathering, in a task monitor storage area [113 and 200; p. 7, lines 23-26 and Figs. 1-2], the first number of messages [512; p. 15, lines 22-26 and Fig. 5, *see also* p. 5, lines 4-6] stored in the first input queue [First input queue; depicted in Fig. 1, *see also* p. 4], the second number of messages [512; p. 15, lines 22-26 and Fig. 5, *see also* p. 5, lines 4-6] stored in the second input queue [Second input queue; depicted in Fig. 1, *see also* p. 4], the third number of messages [512; p. 15, lines 22-26 and Fig. 5, *see also* p. 5, lines 4-6] stored in the first output queue [First output queue; depicted in Fig. 1, *see also* p. 4], the fourth number of messages [512; p. 15, lines 22-26 and Fig. 5, *see also* p. 5, lines 4-6] stored in the second output queue [Second output queue; depicted in Fig. 1, *see also* p. 4], and the activation status [510; pp. 5, lines 7-8, p. 7, line 26 through p. 8, line 2, p. 15, lines 15-21

and Fig. 5] of the processing task [**Input Task 104**; p. 4, lines 16-19, p. 5, line 1, p. 7, lines 5-12 and 19-28 and Fig. 1].

B. Claim 13

Independent Claim 13 is directed to methods of collecting data from a message queuing transmission system such as the exemplary system 100 depicted in Fig. 1 of the present application. Pursuant to these methods, a first group of queues such as the group of "input queues" shown in Fig. 1 are assigned to a first queue group and a second group of queues such as the group of "output queues" shown in Fig. 1 are assigned to a second queue group. The number of messages stored in each queue in the first queue group and the number of messages stored in each queue in the second queue group may then be determined by, for example, counting the number of messages in each queue. The activation status (i.e., activated/deactivated) of one or more application processing tasks may then be determined, and the number of messages stored in each queue in the first queue group and in each queue in the second queue group, as well as the determined activation status of the application processing task(s) may then be output to, for example, a display area 113.

To further explain the subject matter of Claim 13, Appellants have repeated Claim 13 below and, in bold, bracketed text, identified the reference numeral or other identifier that comprises an example of the claimed subject matter according to certain embodiments of the present invention, followed by page and line number references to exemplary locations in the specification where the reference numeral/identifier is discussed:

13. A method of collecting data [**200; Fig. 2**] from a message queuing transmission system [**100; p. 6, line 18 through p. 8, line 13 and Fig. 1**], the method comprising:

assigning a first plurality of queues [**Input queues; depicted in Fig. 1, see also p. 4**] that comprise part of the message queuing transmission system [**100; p. 6, line 18 through p. 8, line 13 and Fig. 1**] to a first queue group [**Input Queues Group; p. 4, lines 21-24, p. 7, lines 5-12 and Fig. 1**];

assigning a second plurality of queues [**Output queues; depicted in Fig. 1, see also p. 4**] that comprise part of the message queuing transmission system [**100; p. 6, line 18 through p. 8, line 13 and Fig. 1**] to a second queue group [**Output Queues Group; p. 4, lines 21-24, p. 7, lines 5-12 and Fig. 1**];

determining the number of messages [512; p. 15, lines 22-26 and Fig. 5, *see also* p. 5, lines 4-6] stored in each queue [Input queues; depicted in Fig. 1, *see also* p. 4] in the first queue group [Input Queues Group; p. 4, lines 21-24, p. 7, lines 5-12 and Fig. 1];

determining the number of messages [512; p. 15, lines 22-26 and Fig. 5, *see also* p. 5, lines 4-6] stored in each queue [Output queues; depicted in Fig. 1, *see also* p. 4] in the second queue group [Output Queues Group; p. 4, lines 21-24, p. 7, lines 5-12 and Fig. 1];

determining an activation status [510; p. 5, lines 7-8, p. 7, line 26 through p. 8, line 2, p. 15, lines 15-21 and Fig. 5] of at least one of the application processing tasks [Input Task 104; p. 4, lines 16-19, p. 5, line 1, p. 7, lines 5-12 and 19-28 and Fig. 1] that implements the message queuing transmission system [100; p. 6, line 18 through p. 8, line 13 and Fig. 1]; and

outputting the determined number of messages [202; Fig. 2] stored in each queue [Input queues; depicted in Fig. 1, *see also* p. 4] in the first queue group [Input Queues Group; p. 4, lines 21-24, p. 7, lines 5-12 and Fig. 1], the determined number of messages [202; Fig. 2] stored in each queue [Output queues; depicted in Fig. 1, *see also* p. 4] in the second queue group [Output Queues Group; p. 4, lines 21-24, p. 7, lines 5-12 and Fig. 1] and the determined activation status [206; Fig. 2] of the at least one of the application processing tasks [Input Task 104; p. 4, lines 16-19, p. 5, line 1, p. 7, lines 5-12 and 19-28 and Fig. 1].

Grounds of Rejection to be Reviewed on Appeal

1. The rejections of Claims 1-18 under 35 U.S.C. § 112.
2. The rejections of Claims 1, 3, 6-8, 13-14 and 17 under 35 U.S.C. § 103(a) as being unpatentable over U.S. Patent No. 6,246,691 to Briem et al. ("Briem") in view of U.S. Patent No. 6,085,277 to Nordstrom et al. ("Nordstrom").
3. The rejections of Claims 2 and 15 under 35 U.S.C. § 103(a) as being unpatentable over Briem in view of Nordstrom and U.S. Patent Publication No. 2002/0035620 A1 to Takahashi et al. ("Takahashi").
4. The rejections of Claims 4-5, 9-12, 16 and 18 under 35 U.S.C. § 103(a) as being unpatentable over Briem in view of Nordstrom and U.S. Patent No. 6,757,289 to Cain et al. ("Cain").

Argument

I. The Rejections Under 35 U.S.C. § 112 Should be Reversed

A. The Rejections of Claims 1-12

Claims 1-12 were rejected in the Final Office Action under 35 U.S.C. § 112 on the grounds that the term "status information" in Claim 1 is indefinite. (Final Office Action at p. 2). In particular, the Final Office Action states that it is not clear what the term "status information" refers to, and that there is no established relationship between the term "status information" and anything else in the body of Claim 1. (Final Office Action at p. 2). Appellants argued in their *Response After Final* that the rejections of Claims 1-12 under Section 112 was not supportable. Appellants also authorized the Examiner to delete the phrase "gathering status information in" at lines 1-2 of Claim 1 by an Examiner's Amendment as an alternative means for overcoming the rejections of Claims 1-12 under Section 112. The July 19, 2005 Advisory Action only cited to the rejections under 35 U.S.C. § 103 as a reason as to why the application was not in condition for allowance. (See July 19, 2005 Advisory Action at ¶ 11). The July 19, 2005 Advisory Action likewise did not include an Examiner's Amendment deleting the phrase "gathering status information" from Claim 1. Based on this, Appellants assume that the Examiner has withdrawn the rejections of Claims 1-12 under 35 U.S.C. § 112. However, as the July 19, 2005 Advisory Action likewise did not expressly indicate that the rejection of Claims 1-12 under Section 112 had been withdrawn, Appellants explain briefly in the following paragraph why the rejections of Claims 1-12 under 35 U.S.C. § 112 should be reversed in the event that these rejections have not already been withdrawn by the Examiner.

The preamble of Claim 1 states that the claim is directed to a "method for gathering status information." The last clause of Claim 1 identifies certain of the types of status information that are gathered, including (1) a first number of messages stored in a first input queue, (2) a second number of messages stored in a second input queue, (3) a third number of messages stored in a first output queue, (4) a fourth number of messages stored in a second output queue, and (5) the activation status of a processing task. Appellants respectfully submit that, from both Claim 1 itself and from the application as a whole, it is clear that the phrase "gathering status information" recited in the preamble of Claim 1 refers to at least the above-mentioned types of status information that Claim 1 specifically recites are gathered

according to the claimed methods. As such, Appellants respectfully submit that Claim 1 is not indefinite.

B. The Rejections of Claims 13-18

1. The Rejection of Claims 13-18 Based on the First and Second Plurality of Queues Recitations

Claims 13-18 were rejected in the Final Office Action under 35 U.S.C. § 112 on the grounds that the terms "a first plurality queues" and "a second plurality queues" are indefinite, as it is unclear whether these terms are intended to be singular or plural. (Final Office Action at p. 2). These terms included inadvertent typographical errors in that the word "of" was left out of each term. Claim 13 was amended in the *Response After Final* to correct these typographical errors, and this amendment was entered by the Examiner. Appellants assume that this amendment has overcome the above-mentioned rejection of Claims 13-18 under Section 112.

2. The Rejection of Claims 13-18 Based on the Message Queuing Transmission System Recitation

Claims 13-18 also were rejected in the Final Office Action under 35 U.S.C. § 112 on the grounds that it is unclear whether the two incidences of the term "part of the message queuing transmission system" refer to one or two different things. (Final Office Action at p. 3). Appellants also traversed this rejection in their *Response After Final*, and it is unclear whether or not this rejection is still being maintained. In any event, to the extent the rejection is being maintained, Appellants respectfully submit that it should be reversed for the following reason.

The objected to terms of Claim 13 are part of two larger recitations, namely:

1. "assigning a first plurality of queues that comprise part of the message queuing transmission system to a first queue group" and
2. "assigning a second plurality of queues that comprise part of the message queuing transmission system to a second queue group"

Under standard English conventions, the phrase "that comprise part of the message queuing transmission system" modifies the phrase "first plurality of queues" in item 1 above and "second plurality of queues" in item 2 above. Thus, in Claim 13, the "first plurality of

queues" encompass queues that are part of the message transmission system and the "second plurality of queues" likewise encompass queues that are part of the same message transmission system. Accordingly, Appellants respectfully submit that the above identified indefiniteness rejection – to the extent it is still being maintained by the Examiner – should be reversed, as it is clear that in both cases the claim language refers to the same "message queuing transmission system."

3. The Rejection of Claims 13-18 Based on the Application Processing Tasks Recitation

Finally, Claim 13 was rejected in the Final Office Action under 35 U.S.C. § 112 because the phrase "the application processing tasks" lacked antecedent basis. (Final Office Action at p. 3). Claim 13 was amended in the *Response After Final* to correct these typographical errors, and this amendment was entered by the Examiner. Appellants assume that this amendment obviated the above-mentioned rejection of Claims 13-18 under Section 112.

For the foregoing reasons, Appellants respectfully submit that any remaining rejections under 35 U.S.C. § 112 should be reversed.

II. The Rejections of Claims 1, 3, 6-8, 13-14 and 17 Under 35 U.S.C. § 103 Should be Reversed

A. Introduction

As noted above, Claims 1-18 stand rejected under 35 U.S.C. § 103 as obvious. A determination under Section 103 that an invention would have been obvious to someone of ordinary skill in the art is a conclusion of law based on fact. *Panduit Corp. v. Dennison Mfg. Co.* 810 F.2d 1593, 1 U.S.P.Q.2d 1593 (Fed. Cir. 1987), *cert. denied*, 107 S.Ct. 2187. After the involved facts are determined, the decision maker must then make the legal determination of whether the claimed invention as a whole would have been obvious to a person having ordinary skill in the art at the time the invention was unknown, and just before it was made. *Id.* at 1596. The United States Patent and Trademark Office has the initial burden under Section 103 to establish a *prima facie* case of obviousness. *In re Fine*, 837 F.2d 1071, 5 U.S.P.Q.2d 1596, 1598 (Fed. Cir. 1988).

To establish a *prima facie* case of obviousness, the prior art references cited in the rejection, when combined, must teach or suggest *all* the recitations of the claims, and there must be some suggestion or motivation, either in the references themselves or in the knowledge generally available to one of ordinary skill in the art, to combine the reference teachings in the manner suggested. M.P.E.P. § 2143. The mere fact that references can be combined or modified does not render the resultant combination obvious unless the prior art also suggests the desirability of the combination. M.P.E.P. § 2143.01, citing *In re Mills*, 916 F.2d 680, 16 U.S.P.Q.2d 1430 (Fed. Cir. 1990). As emphasized by the Court of Appeals for the Federal Circuit, to support combining references, evidence of a suggestion, teaching, or motivation to combine must be clear and particular, and this requirement for clear and particular evidence is not met by broad and conclusory statements about the teachings of references. *In re Dembiczak*, 50 U.S.P.Q.2d 1614, 1617 (Fed. Cir. 1999). Thus, in support of a Section 103 rejection, particular evidence from the prior art must be provided showing why a skilled artisan, with no knowledge of the claimed invention, would have combined the cited references in the manner claimed in the rejection. *In re Kotzab*, 55 U.S.P.Q.2d 1313, 1317 (Fed. Cir. 2000).

Furthermore, as stated by the Federal Circuit with regard to the selection and combination of references:

This factual question of motivation is material to patentability, and could not be resolved on subjective belief and unknown authority. It is improper, in determining whether a person of ordinary skill would have been led to this combination of references, simply to "[use] that which the inventor taught against its teacher." *W.L. Gore v. Garlock, Inc.*, 721 F.2d 1540, 1553, 220 USPQ 303, 312-13 (Fed. Cir. 1983). Thus the Board must not only assure that the requisite findings are made, based on evidence of record, but must also explain the reasoning by which the findings are deemed to support the agency's conclusion....

In re Sang Su Lee, 277 F.3d 1338, 1343 (Fed. Cir. 2002).

Appellants respectfully submit that the pending claims are patentable over the cited references because the cited combinations of references fail to disclose or suggest all of the recitations of the pending claims, and because the reasoning behind such combinations has not been established. The patentability of the pending claims is discussed in detail hereinafter.

B. The Rejection of Claim 1

Independent Claim 1 stands rejected under 35 U.S.C. § 103 as obvious in view of U.S. Patent No. 6,246,691 to Briem ("Briem") in view of U.S. Patent No. 6,085,277 to Nordstrom ("Nordstrom"). Claim 1 recites as follows:¹

1. A computer implemented method for gathering status information in a message queuing transmission system, the method comprising:

[a] forming a first queue group by assigning an input queue group identifier to a first input queue and to a second input queue within a message queuing transmission system;

[b] forming a second queue group by assigning an output queue group identifier to a first output queue and to a second output queue within the message queuing transmission system;

[c] assigning a first queue identifier to the first input queue, a second queue identifier to the second input queue, a third queue identifier to the first output queue, and a fourth queue identifier to the second output queue;

[d] assigning a task identifier to a processing task within the message queuing transmission system;

[e] determining a first number of messages stored in the first input queue, a second number of messages stored in the second input queue, a third number of messages stored in the first output queue, and a fourth number of messages stored in the second output queue;

[f] determining an activation status of the processing task; and

[g] gathering, in a task monitor storage area, the first number of messages stored in the first input queue, the second number of messages stored in the second input queue, the third number of messages stored in the first output queue, the fourth number of messages stored in the second output queue, and the activation status of the processing task.

The Final Office Action states that Briem teaches all of the recitations of Claim 1 except for recitations [e] and [g] above. (Final Office Action at pp. 3-4). Appellants submit, however, that the combination of Briem and Nordstrom (the references upon which the rejection of Claim 1 is based) fail to disclose or suggest at least recitations [a], [b], [d], [e], [f] and [g] of Claim 1. Appellants likewise dispute the alleged motivation to combine Briem and

¹ Identifiers, [a], [b], [c], . . . have been added to simplify the discussion of the rejection of Claim 1.

Nordstrom, and submit that any combination of Briem and Nordstrom would look nothing like the invention of Claim 1. Accordingly, Appellants submit that the rejection of Claim 1 under 35 U.S.C. § 103 should be reversed.

1. The Cited Art Does Not Disclose Recitations [a] or [b] of Claim 1

The Final Office Action first states that Briem discloses forming a first queue group by assigning a queue group identifier and forming a second queue group by assigning a queue group identifier as recited in recitations [a] and [b] of Claim 1. (Final Office Action at 4). In the Advisory Action, it is conceded that Briem does not disclose the portions of recitations [a] and [b] of Claim 1 that (1) the first and second queues in the first queue group be input queues and (2) that first and second queues in the second queue group be output queues. (Advisory Action at ¶ 11). For these portions of recitations [a] and [b], the Examiner points to Col. 7, lines 63-67 and Col. 10, lines 41-55 of Nordstrom as disclosing "a message queuing system that . . . reads and writes (with input and output capabilities) to message queues." (Advisory Action at ¶ 11). Appellants respectfully submit, however, that such a combination of Briem and Nordstrom does not disclose or suggest recitations [a] and [b] of Claim 1.

In particular, the first cited portion of Nordstrom (Col. 7, lines 63-67) describes a write operation that is performed to an address register. This has nothing to do with forming a group of input queues or a group of output queues, and clearly does not, in combination with Briem, disclose or suggest recitations [a] or [b] of Claim 1. The second cited portion of Nordstrom (Col. 10, lines 41-55) discusses reading a command from memory and then enqueueing response messages. Once again, this simply has nothing to do with forming groups of input and output queues. Moreover, the cited portions of Nordstrom have no conceivable relationship or relevance to the system of Briem. Thus, as the cited prior art fails to disclose or suggest recitations [a] and [b] of Claim 1, the rejection of Claim 1 should be reversed.

2. The Cited Art Does Not Disclose Recitation [d] of Claim 1

Recitation [d] of Claim 1 states "assigning a task identifier to a processing task within the message queuing transmission system." This recitation of Claim 1 is nowhere mentioned in the Final Office Action's discussion of the rejection of Claim 1. The Advisory Action likewise completely ignores this recitation of Claim 1, even though this recitation was specifically brought to the Examiner's attention in Appellants' *Response After Final* as a

claim recitation that was nowhere addressed in the Final Office Action. Appellants respectfully submit that this recitation is not taught by the cited art. In any event, the Examiner's refusal to acknowledge the presence of this recitation in Claim 1 and the failure of the Final Office Action to indicate where this recitation is allegedly taught by the cited art compels reversal of the rejection of Claim 1.

3. The Cited Art Does Not Disclose Recitation [f] of Claim 1

The Final Office Action further states that Briem, at Col. 2, lines 40-48, discloses "determining an activation status of the processing task" as recited in clause [f] of Claim 1. Appellants respectfully submit, however, the cited portion of Briem has nothing to do with "determining an activation status of the processing task." In fact, no processing task is identified in the cited portion of Briem, let alone any teachings regarding determining the activation status of such a processing task. Moreover, nowhere else does Briem discuss or disclose "determining an activation status of the processing task."

Appellants raised this issue in their Response After Final, and specifically requested that the examiner identify what processing task is disclosed in Briem and how Briem determines the activation status of the identified processing task in the event that the rejections of Claim 1 was maintained. The Examiner maintained the rejection of Claim 1, but did not identify what in Briem purportedly constitutes the processing task and/or how Briem identifies the activation status of any processing task. (*See Response After Final* at 9-10; *Advisory Action* at ¶ 11). In any event, Appellants respectfully submit that the failure of the cited art to disclose or suggest recitation [f] of Claim 1 provides another independent basis for the reversal of the rejection of Claim 1.

4. The Cited Art Does Not Disclose Recitation [e] of Claim 1

The Final Office Action concedes that recitation [e] of Claim 1 is not disclosed or suggested in Briem. (Final Office Action at p. 4). The Final Office Action cites to Nordstrom as disclosing this recitation of Claim 1, and contends that it would have been obvious to combine Briem and Nordstrom to arrive at the invention of Claim 1. Appellants also respectfully dispute this finding of the Final Office Action.

In particular, the Final Office Action states Nordstrom teaches counting the number of messages in the input and output queues by its disclosure of Message Counter 270 in FIG.

1B. However, Nordstrom expressly states that the Message Counter 270 counts the number of reply messages sent by an I/O adapter 200. As such, Nordstrom clearly does not include any teaching or disclosure of counting a first number of messages stored in first and second input queues as recited in Claim 1, as all that is counted is sent messages.

5. The Cited Art Does Not Disclose Recitation [g] of Claim 1

Recitation [g] of Claim 1 states:

gathering, in a task monitor storage area, the first number of messages stored in the first input queue, the second number of messages stored in the second input queue, the third number of messages stored in the first output queue, the fourth number of messages stored in the second output queue, and the activation status of the processing task.

As with recitation [d], recitation [g] of Claim 1 is nowhere mentioned in either the Final Office Action or the Advisory Action. Appellants respectfully submit that this recitation is not taught by the cited art. In any event, the failure of the Final Office Action to indicate where recitation [g] is allegedly taught by the cited art compels reversal of the rejection of Claim 1.

6. The Rejection of Claim 1 Fails to Identify the Requisite Motivation to Combine the Cited Art

In rejecting Claim 1, the Final Office Action states that it "would have been obvious to one of ordinary skill in the art at the time the invention was made to combine Briem and Nordstrom because this would optimize the overall processor utilization and computer system performance of the existing system." (Final Office Action at 4). Appellants respectfully submit that this conclusory statement is unsupported by the evidence of record and is factually incorrect. In any event, the Final Office Action does not even attempt to explain how some alleged combination of Briem and Nordstrom would optimize overall processor utilization and computer system performance", nor does it attempt to explain why a person of skill in the art would have thought to combine these two particular references from the multitude of available references, let alone why one of skill in the art would have tried to combine them in the manner suggested in the Final Office Action. This failure to show the requisite motivation to combine provides yet another independent reason for reversal of the pending rejection of Claim 1.

C. The Rejections of Claims 3 and 6-8

Claims 3 and 6-8 depend from Claim 1. Accordingly, Claims 3 and 6-8 are patentable for each of the reasons that Claim 1 is patentable over the cited art. Additionally, as discussed in the following subsections, at least Claims 3 and 8 are independently patentable over the cited art.

1. Claim 3 is Independently Patentable Over the Cited Art

Claim 3 depends from Claim 1 and hence is patentable over the cited art for at least the six (6) independent reasons, discussed above, that Claim 1 is patentable over the cited art. In addition, Claim 3 is also independently patentable. In particular, the rejection of Claim 3 in the Final Office Action states, in full, that "Nordstrom teaches presenting contents of the task monitor storage area on a display screen because it is inherent that a computer has a monitor to display output." (Final Office Action at p. 4). Even assuming, *arguendo*, that a monitor is an inherent part of a computer, it certainly is not inherent that all computer monitors "present[] the contents of [a] task monitor storage area on a display screen" as recited in Claim 3, and the Examiner does not even attempt to explain why the actual recitation of Claim 3 would be inherent in all computer systems. Thus, the rejection of Claim 3 should be reversed for at least this additional reason.

2. Claim 8 is Independently Patentable Over the Cited Art

Claim 8 depends from Claim 1 and hence is patentable over the cited art for at least the six (6) independent reasons, discussed above, that Claim 1 is patentable over the cited art. In addition, Claim 8 is also independently patentable. In fact, the Final Office Action concedes that neither of the cited references disclose or suggest the recitations of Claim 8. Instead, the Final Office Action takes "Official Notice" that "both the concept and advantages of providing that storing data in data tables is well known and expected in the art." Even assuming, *arguendo*, that this statement is accurate, "storing data in data tables" is not what is recited in Claim 8. Instead, Claim 8 recites several specific steps that are performed, and it is these steps, as opposed to "storing data in data tables" that must be shown to support any rejection of Claim 8. Thus, the rejection of Claim 8 should be reversed for at least this additional reason.

D. The Rejection of Claim 13

Independent Claim 13 stands rejected under 35 U.S.C. § 103 "for the same reasons stated in the rejection of Claim 1." (Final Office Action at p. 6). For at least the reasons discussed above with respect to Claim 1, Appellants respectfully submit that combination of Briem and Nordstrom clearly do not disclose or suggest the invention of Claim 13, and thus Appellants respectfully request reversal of the rejection of Claim 13.

E. The Rejections of Claims 14 and 17

Claims 14 and 17 depend from Claim 13. Accordingly, Claims 14 and 17 are patentable for each of the reasons that Claim 13 is patentable over the cited art. Additionally, as discussed in the following subsections, at least Claim 14 is independently patentable over the cited art.

1. Claim 14 is Independently Patentable Over the Cited Art

Additionally, with respect to Claim 14, Appellants have carefully reviewed the portions of Briem that the Final Office Action claims disclose the recitations of Claim 14. Appellants review reveals that the cited portions of Briem appear to have nothing to do with the recitations of Claim 14. Claim 14 discusses using the number of messages stored in various queues and the activation status of one or more processing tasks to monitor the status of one or more external applications. Nothing remotely resembling the recitation of Claim 14 is disclosed or suggested in Briem. Accordingly, the rejections of Claim 14 should be reversed for at least this additional reason.

III. The Rejections of Claims 2-12 Under 35 U.S.C. § 103 Should be Reversed

Claims 2 and 15 stand rejected under 35 U.S.C. § 103 as obvious over Briem, Nordstrom and Takahashi. As Claim 2 depends from Claim 1, and Claim 15 depends from Claim 13, Claims 2 and 15 are patentable over the cited art for at least the same reasons discussed above that Claims 1 and 13, respectively, are patentable over the cited art. Appellants also submit that Claims 2 and 15 are independently patentable over the cited art. In particular, the Final Office Action does not even attempt to explain why a person of skill in the art would have chosen to use the refresh counter of Takahashi with the systems of Briem and Nordstrom. Appellants submit that Briem, Nordstrom and Takahashi represent widely

disparate references and that the only motivation to combine these references is the motivation to use the claims as a roadmap to cobble together a rejection. Such motivation, however, is not a proper motivation to combine that may be used to support an obviousness rejection. Accordingly, the rejections of Claims 2 and 15 should be reversed for at least this additional reason.

IV. The Rejections of Claims 4-5, 9-12, 16 and 18 Under 35 U.S.C. § 103 Should be Reversed

Claims 4-5, 9-12, 16 and 18 stand rejected under 35 U.S.C. § 103 as obvious over Briem, Nordstrom and Cain. As Claims 4-5 and 9-12 depend from Claim 1, and Claims 16 and 18 depend from Claim 13, Claims 4-5 and 9-12, as well as Claims 16 and 18 are patentable over the cited art for at least the same reasons discussed above that Claims 1 and 13, respectively, are patentable over the cited art. Appellants likewise submit that the rejections of Claims 4-5, 9-12, 16 and 18, like the rejections of Claims 2 and 15, reflect an improper attempt to use the present patent application as a roadmap to cobble together a rejection. Accordingly, the rejections of Claims 4-5, 9-12, 16 and 18 should be reversed for at least this additional reason.

V. Conclusion

In light of the above, Appellants submit that each of the pending claims is patentable over the cited references and, therefore, request reversal of the rejections of Claims 1-18.

Respectfully submitted,

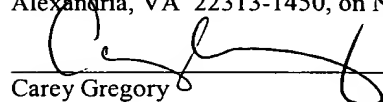


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I hereby certify that this correspondence is being deposited with the United States Postal Service as first class mail in an envelope addressed to: Mail Stop Appeal-Brief Patents, Commissioner for Patents, P.O. box 1450, Alexandria, VA 22313-1450, on November 30, 2005.


Carey Gregory



CLAIMS APPENDIX

Pending Claims USSN 09/942,135

Filed August 29, 2001

1. (Previously Presented) A computer implemented method for gathering status information in a message queuing transmission system, the method comprising:

forming a first queue group by assigning an input queue group identifier to a first input queue and to a second input queue within a message queuing transmission system;

forming a second queue group by assigning an output queue group identifier to a first output queue and to a second output queue within the message queuing transmission system;

assigning a first queue identifier to the first input queue, a second queue identifier to the second input queue, a third queue identifier to the first output queue, and a fourth queue identifier to the second output queue;

assigning a task identifier to a processing task within the message queuing transmission system that is able to read a plurality of messages from one of the queues in the first queue group and to write a plurality of messages to at least one of the queues in the second queue group;

determining a first number of messages stored in the first input queue, a second number of messages stored in the second input queue, a third number of messages stored in the first output queue, and a fourth number of messages stored in the second output queue;

determining an activation status of the processing task; and

gathering, in a task monitor storage area, the first number of messages stored in the first input queue, the second number of messages stored in the second input queue, the third number of messages stored in the first output queue, the fourth number of messages stored in the second output queue, and the activation status of the processing task.

2. (Original) The method of claim 1, repeating the steps of determining and the step of gathering according to a refresh time interval of a refresh counter.

3. (Original) The method of claim 1, further including the step of presenting contents of the task monitor storage area on a display screen.

4. (Original) The method of claim 1, further including the step of writing an error message from the processing task to an error-log queue.

5. (Original) The method of claim 4, further including the step of presenting the error message on a display screen.

6. (Original) The method of claim 1, wherein the first queue identifier, the second queue identifier, the third queue identifier, and the fourth queue identifier are each different.

7. (Original) The method of claim 1, wherein the processing task is a background task.

8. (Original) The method of claim 1, further including the steps of:
storing the task identifier in a task identifier table;
storing the first queue group identifier and the second queue group identifier in a queues groups table; and
storing the first queue identifier, the second queue identifier, the third queue identifier, and the fourth queue identifier in a queues table.

9. (Original) The method of claim 1, further including the step of assigning a reply-to-group identifier to a reply queue for receiving a reply message generated in response to an outgoing message, wherein the reply message is generated by a down-stream software application for receiving the outgoing message.

10. (Original) The method of claim 9, wherein the reply message is taken from the reply queue and processed by a reply task.

11. (Original) The method of claim 9, further including the step of computing a time interval between writing the outgoing message to an output queue of the message queuing transmission system and writing the reply message to the reply queue.

12. (Original) The method of claim 11, further including the step of comparing said time interval with a predetermined time control interval.

13. (Previously Presented) A method of collecting data from a message queuing transmission system, the method comprising:

assigning a first plurality of queues that comprise part of the message queuing transmission system to a first queue group;

assigning a second plurality of queues that comprise part of the message queuing transmission system to a second queue group;

determining the number of messages stored in each queue in the first queue group;

determining the number of messages stored in each queue in the second queue group;

determining an activation status of at least one of the application processing tasks that implements the message queuing transmission system; and

outputting the determined number of messages stored in each queue in the first queue group, the determined number of messages stored in each queue in the second queue group and the determined activation status of the at least one of the application processing tasks.

14. (Previously Presented) The method of Claim 13, wherein the output determined number of messages stored in each queue in the first queue group, the determined number of messages stored in each queue in the second queue group and the determined activation status of the at least one of the application processing tasks is used to monitor the status of at least one external application.

15. (Previously Presented) The method of Claim 13, further comprising repeating the steps of determining the number of messages stored in each queue in the first queue group, determining the number of messages stored in each queue in the second queue group, and determining the activation status of at least one of the application processing tasks that implements the message queuing transmission system according to a refresh time interval of a refresh counter.

16. (Previously Presented) The method of Claim 13, the method further comprising outputting at least some of a plurality of error messages generated by the at least one of the application processing tasks.

17. (Previously Presented) The method of Claim 13, wherein the at least one of the application processing task is a background task.

18. (Previously Presented) The method of Claim 13, the method further comprising determining the time elapsed between the time a message is sent from one of the second

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plurality queues until a reply message is received by a queue that is part of a third queue group.

EVIDENCE APPENDIX

No evidence is being submitted with this Appeal Brief pursuant to 37 C.F.R. §§
1.130, 1.131 or 1.132.

RELATED PROCEEDINGS APPENDIX

There are no related proceedings.